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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/664,158	09/17/2003	Hajime Imai	4633-0105P	4180
2292 7590 07/17/2007 BIRCH STEWART KOLASCH & BIRCH PO BOX 747 FALLS CHURCH, VA 22040-0747			EXAMINER PATEL, ISHWARBHAI B	
			ART UNIT	PAPER NUMBER
			2841	
			NOTIFICATION DATE	DELIVERY MODE
			07/17/2007	ELECTRONIC

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

mailroom@bskb.com

## Office Action Summary

Application No.

10/664,158

Applicant(s)

IMAI ET AL.

Examiner

Ishwar (I. B.) Patel

Art Unit

2841

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 20 February 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) 13-15 is/are withdrawn from consideration.
- 5) ☒ Claim(s) 3-9, 11 and 12 is/are allowed.
- 6) ☒ Claim(s) 1, 2 and 10 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 17 September 2003 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |                                                                                                            |                                                                                         |
|------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                                | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                       | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____                                                |

### **DETAILED ACTION**

1. This action is in response to the amendment filed on February 20, 2007.

#### ***Drawings***

2. The drawings are objected to because the figures are improperly cross hatched. All of the parts shown in section, and only those parts, must be cross-hatched. The cross-hatching patterns should be selected from those shown on page 600-114/115 of the MPEP based on the material of the part. See also 37 CFR 1.84(h)(3) and MPEP § 608.02.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner,

the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

3. Figures 17-21 should be designated by a legend such as --Prior Art-- because only that which is old is illustrated. See MPEP § 608.02(g). Corrected drawings in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. The replacement sheet(s) should be labeled "Replacement Sheet" in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of the drawing figures. If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

### ***Claim Rejections - 35 USC § 102***

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

5. Claims 1, 2 and 10 are rejected under 35 U.S.C. 102(b) as being anticipated by Ikubo (US Patent No. 5,734,458).

**Regarding claim 1**, Ikubo in figure 3A discloses a wiring substrate, comprising a short ring (30) formed along a periphery of the substrate; an independent line pattern

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(29) that is coplanar with and independent of the short ring, a continuous line pattern (28) that is located closest to the independent line pattern and is coplanar and continuous with the short ring, wherein the continuous line pattern serves a distinct function in the wiring substrate from the independent line pattern; and an insulating film covering the independent line pattern and the continuous line pattern (insulating film formed with via holes 28a, 29a, but not shown in figure, column 8, line 11-25), wherein the insulating film includes a first through hole (29a) reaching the independent line pattern and a second through hole (28a) reaching the continuous line pattern.

**Regarding claim 2,** Ikubo further discloses a distance between the first through hole and the continuous line pattern is longer than a distance between the second through hole and the continuous line pattern along a virtual line extending between the first through hole and the second through hole (see figure, the location of hole 28a and 29a are such that distance between the first through hole (29a) and the continuous line pattern is longer than a distance between the second through hole and the continuous line pattern along a virtual line extending between the first through hole and the second through hole).

**Regarding claim 10,** Ikubo further discloses a display device (21, figure 1) comprising the wiring substrate of claim 1.

6. Claims 1 and 10 rejected under 35 U.S.C. 102(a) as being anticipated by prior art figure 17.

**Regarding claim 1**, prior art discloses a wiring substrate, comprising a short ring (SR) formed along a periphery of the substrate; an independent line pattern (GT) that is coplanar with and independent of the short ring, a continuous line pattern (GL, CsT) that is located closest to the independent line pattern and is coplanar and continuous with the short ring, wherein the continuous line pattern serves a distinct function in the wiring substrate from the independent line pattern; and an insulating film (GI) covering the independent line pattern and the continuous line pattern, wherein the insulating film includes a first through hole (GO) reaching the independent line pattern and a second through hole (GO) reaching the continuous line pattern.

**Regarding claim 10**, the prior art further discloses a display device comprising the wiring substrate of claim 1 (specification, page 1, line 10-20).

***Allowable Subject Matter***

7. Claims 3-9, 11 and 12 are allowed.

***Response to Arguments***

8. Applicant's arguments with respect to claims 1, 2 and 10 have been considered but are moot in view of the new ground(s) of rejection.

**Conclusion**

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

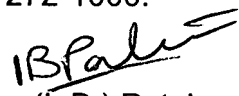
Kim (US Patent Application Publication No. 2002/0089614) in figure 6 discloses a wiring substrate with shorting ring (61a, 61b, 61c, 61d).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ishwar (I. B.) Patel whose telephone number is (571) 272 1933. The examiner can normally be reached on M-F (8:30 - 5:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dean Reichard can be reached on (571) 272 1984. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

ibp  
July 9, 2007

  
Ishwar (I. B.) Patel  
Primary Examiner  
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